

Title (en)
MEMBRANE DIGITAL ANALOG SWITCHES

Title (de)
DIGITAL-ANALOG-MEMBRANSCHALTER

Title (fr)
COMMUTATEURS ANALOGIQUES NUMÉRIQUES À MEMBRANE

Publication
EP 3731252 A1 20201028 (EN)

Application
EP 20150801 A 20200108

Priority
US 201916396049 A 20190426

Abstract (en)
A membrane digital analog switch includes an input button surface adapted to receive an input pressure from a user, and a digital switch positioned below the input button surface to generate a digital switch activation signal when the received pressure on the input button surface is greater than or equal to a specified digital pressure threshold. The membrane digital analog switch also includes an analog switch adapted to generate an analog switch activation signal when the received pressure on the input button surface is greater than or equal to a specified analog pressure threshold. The specified analog pressure threshold is greater than the specified digital pressure threshold, the digital switch activation signal is a binary digital signal, and the analog switch activation signal is variable and corresponds to an analog sensed value of the received pressure on the input button surface.

IPC 8 full level
H01H 13/803 (2006.01); **H03K 17/965** (2006.01)

CPC (source: CN EP US)
G01L 1/005 (2013.01 - US); **G06F 3/016** (2013.01 - CN); **H01H 13/803** (2013.01 - EP); **H03K 17/9647** (2013.01 - CN); **H03M 1/36** (2013.01 - US); **H03M 1/74** (2013.01 - US); **H01H 13/785** (2013.01 - EP); **H01H 13/807** (2013.01 - EP); **H01H 2201/036** (2013.01 - EP); **H01H 2215/004** (2013.01 - EP); **H01H 2225/002** (2013.01 - EP); **H01H 2227/026** (2013.01 - EP); **H01H 2231/032** (2013.01 - EP)

Citation (search report)

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Designated contracting state (EPC)
AL AT BE BG CH CY CZ DE DK EE ES FI FR GB GR HR HU IE IS IT LI LT LU LV MC MK MT NL NO PL PT RO RS SE SI SK SM TR

Designated extension state (EPC)
BA ME

DOCDB simple family (publication)
US 10523233 B1 20191231; CA 3068210 A1 20201026; CA 3068210 C 20240312; CA 3217555 A1 20201026; CN 111865288 A 20201030; CN 212543757 U 20210212; EP 3731252 A1 20201028; EP 3731252 B1 20220504; US 10938406 B2 20210302; US 2020343902 A1 20201029

DOCDB simple family (application)
US 201916396049 A 20190426; CA 3068210 A 20200116; CA 3217555 A 20200116; CN 202010340256 A 20200426; CN 202020658006 U 20200426; EP 20150801 A 20200108; US 201916724910 A 20191223